State of California AIR RESOURCES BOARD

Notice of Public Availability of Modified Text

PUBLIC HEARING TO CONSIDER PROPOSED AMENDMENTS TO THE CALIFORNIA REGULATION REQUIRING DEPOSIT CONTROL ADDITIVES IN MOTOR VEHICLE GASOLINE

Public Hearing Date: September 24, 1998 Public Availability Date: October 28, 1998 Deadline for Public Comment: November 12, 1998

At a public hearing held September 24, 1998, the Air Resources Board (the "Board") considered amendments to the gasoline deposit control additive regulation in section 2257, title 13, California Code of Regulations. The proposed amendments affected the performance standard requirements, the certification test gasoline requirements, the vehicle test procedures and various other provisions of the regulation and the incorporated test methods. The originally proposed regulatory action is described in detail in the Staff Report, "Proposed Amendments to the California Regulation Requiring Deposit Control Additives in Motor Vehicle Gasoline," released to the public on August 7, 1998.

In resolution 98-46, the Board approved the originally proposed amendments with modifications that were recommended by staff at the September 24, 1998, hearing. In accordance with Government Code section 11346.8(c), the Board directed the Executive Officer to make the modified text available for a supplemental written comment period of 15 days. He is then directed either to adopt the modified regulations with such additional changes as may be appropriate in light of the supplemental comments, or to present them to the Board for further consideration if he determines such an action is warranted by the comments.

The modifications to the originally proposed text consist of the following changes:

• Section 2257(a)(1)[i] was modified to clarify that gasoline certifications which are exempted from the new combustion chamber deposit performance standard include only those certifications utilizing additives that were re-formulated to be used in commercial gasoline after July 1, 1996. As originally proposed by staff, some gasoline certifications which were originally approved prior to July 1, 1996, but amended after July 1, 1996, could be eligible for exemption from the new combustion chamber deposit requirement. This situation is not consistent with the Board's intent to preclude the use of outdated gasoline certifications. The

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modified language addresses this issue by stating that only gasoline certifications which were <u>originally</u> approved after July 1, 1996, would be eligible for exemption from the new combustion chamber deposit requirement.

- Section 2257(a)(1)[i] was also modified to clarify that gasoline certifications approved after July 1, 1996, which are based on the 1994 version of the American Society for Testing and Materials (ASTM) intake valve deposit test method, will remain eligible for exemption from the new combustion chamber deposit requirement, even after the regulation is updated with the 1998 version of the test method.
- Section 2257(c)(1)(A)(i) was modified to remove text left over from a preliminary proposal, which was inadvertently included in the proposed regulation order contained in the staff report.
- Section 2257(c)(1)(A)(iii) was modified to incorporate the ARB's intake valve and combustion chamber deposit test method by reference into the regulation.

The modified regulation is being made available by this notice for public comment prior to final action by the Executive Officer. Attached is the modified text of section 2257 of title 13, California Code of regulations (Attachment A). The originally proposed amendments are shown in *italics* to show additions to the text and strikeouts to show deletions to the text. Modifications to the original proposal are shown in *shadowed italics* to show additions to the text and shadowed strikeouts to show deletions to the text.

Written comments must be submitted to the Board Secretary, Air Resources Board, P.O. Box 2815, Sacramento, California 95812, no later than November 2, 1998, for consideration by the Executive Officer prior to final action. Only comments relating to the modifications described in this notice will be considered by the Executive Officer. The modified text which is being made available for comments are indicated by shadowed text in the following attachments.

Attachment

Attachment A

STAFF'S MODIFIED PROPOSED REGULATION ORDER

§ 2257. Required Additives in Gasoline.

- (a) Regulatory Standard.
- (1) On or after January 1, 1992, no person shall sell, offer for sale, supply, or offer for supply any California gasoline unless at the time of the transaction:/
- [i] the producer, importer, or distributor of the gasoline has been issued a currently effective certification for California gasoline pursuant to subsection (c), originally dated no earlier than July 1, 1996. Existing certifications dated between July 1, 1996 and (insert date 30 days after the effective date of the amendments) that meet the standards described inrequirements of subsection (c)(1)(A)(i) and (c)(1)(A)(ii) [including those which used test method ASTM D 5500-94] are exempted from subsection (c)(1)(A)(iii), and
- [ii] the gasoline contains at least the minimum concentration of the additive or additives identified in the final application for certification.
- (2) Subsection (a)(1) shall not apply to transactions where the person selling, supplying, or offering the gasoline demonstrates that:
- [i] the gasoline has not yet been sold, offered, or supplied from the final distribution facility, and either
- [ii] the person has taken reasonably prudent precautions to assure that he or she will bring the gasoline into satisfaction with the requirements of subsection (a)(1) before it is sold, supplied or offered from the final distribution facility, or
- [iii] at or before the time of the transaction the person has obtained a written statement from the purchaser, recipient, or offeree of the gasoline stating that he or she is a distributor who has been issued a currently effective certification pursuant to subsection (c), and will cause the gasoline to satisfy the requirements of subsection (a)(1) before it is sold, supplied or offered from the final distribution facility.
- (3) Subsection (a)(1)[ii] shall not apply to the sale, supply, or offer of gasoline from a final distribution facility where the person selling, supplying, or offering the gasoline demonstrates that the gasoline will be corrected to comply with section (a)(1)[ii] prior to the sale of gasoline from the retail outlet to be dispensed into motor vehicles. If such corrective action is taken, the producer, importer, or distributor of the gasoline must notify the Compliance Division of the Air Resources Board by telephone or in writing within 2 business days of the correction and must maintain records to document each occurrence in accordance with subsection (d).
- (4) For the purposes of subsection (a)(1), each sale of gasoline at retail for use in a motor vehicle, and each supply of gasoline into a motor vehicle fuel tank, shall also be deemed a sale or supply by any person who previously sold or supplied such gasoline in violation of subsection (a)(1).
 - (b) Definitions.

For the purposes of this section:

(1) "Additive" means any substance or mixture of substances that is intentionally added to gasoline for the purpose of reducing or preventing fuel injection system or intake valve deposits,

and that is not intentionally removed prior to the gasoline's sale or use.

- (2) "Bulk purchaser-consumer" means a person who purchases or otherwise obtains gasoline in bulk and then dispenses it into the fuel tanks of motor vehicles owned or operated by the person.
- (3) "California gasoline" means gasoline sold or intended for sale as a motor vehicle fuel in California.
- (4) "Chemical composition" means the name, percentage by weight, and chemical identification of each compound in an additive.
- (5) "Distributor" means any person who transports or stores or causes the transportation or storage of gasoline, produced or imported by another person, at any point between any producer's or importer's facility and any retail outlet or wholesale purchaser-consumer's facility.
- (6) "Final distribution facility" means the stationary gasoline transfer point from which gasoline is transferred into the cargo tank truck, pipeline, or other delivery vessel from which the gasoline will be delivered to the facility at which the gasoline will be dispensed into motor vehicles.
- (7) "Gasoline" means any fuel which is sold or intended for sale as a California motor vehicle fuel and is either: (a) commonly or commercially known or sold as gasoline, or (b) any fuel blend of gasoline as defined in (a) and alcohol in which the portion of gasoline is more than 50 percent of the total blend.
- (8) "Gasoline production facility" means a facility in California at which gasoline is produced; it does not include a facility whose sole operation is to transfer gasoline or to blend additives into gasoline.
 - (9) "Importer" means any person who first accepts delivery of gasoline in California.
- (10) "Import facility" means the facility at which imported gasoline is first received in California, including, in the case of gasoline imported by cargo tank and delivered directly to a facility for dispensing gasoline into motor vehicles, the cargo tank in which the gasoline is imported.
- (11) "Motor vehicle" has the same meaning as defined in section 415 of the Vehicle Code.
 - (12) "Produce" means to convert liquid compounds which are not gasoline into gasoline.
 - (13) "Producer" means any person who produces California gasoline in California.
- (14) "Retail outlet" means any establishment at which gasoline is sold or offered for sale for use in motor vehicles.
- (15) "Supply" means to provide or transfer a product to a physically separate facility, vehicle, or transportation system.
 - (c) Certification Requirements.
- (1)(A) No gasoline formulation shall be certified under this subsection (c) unless the applicant for certification demonstrates each of the following to the executive officer's satisfaction:
- (i) The gasoline formulation meets the unlimited mileage standard of a maximum of 10050 milligrams averaged over all intake valves when tested in accordance with ASTM D 5500-948, which is incorporated herein by reference, with modifications noted in sections (D)(IV)(8.5.5.1) and (8.7.1.1) of the Stationary Source Division's Test Method for Evaluating Intake Valve and Combustion Chamber Deposits in Motor Vehicles, dated [insert date of adoption] July 2, 1996, which is also incorporated herein by reference. As an

alternative, intake valve deposits may be tested in accordance with subsection (c)(1)(A)(iii).

- (ii) The gasoline formulation does not result in a flow loss of more than five percent for any fuel injector when tested in accordance with-ASTM D 5598-945a, which is incorporated herein by reference.
- (iii) The gasoline formulation meeting the requirements of (c)(1)(A)(i), does not result in more than 1300 milligrams total deposit weight, averaged over all four combustion chambers is capable of reducing fuel injector deposits so that no fuel injector suffers a flow loss of more than five percent, or, does not result in more than 140 percent total deposit weight from all four combustion chambers, relative to the gasoline formulation containing no additive, when tested in accordance with the Stationary Source Division's Test Method for Evaluating Intake Valve and Combustion Chamber Port Fuel Injector Deposits in Vehicle Engines, dated [insert date of adoption] July 2, 1996, which is incorporated herein by reference, which is incorporated herein by reference.
- (B) The executive officer may approve alternative test procedures for demonstrating satisfaction with any of the performance criteria set forth in subsection (c)(1)(A) if an applicant or potential applicant demonstrates to the executive officer's satisfaction that a gasoline formulation which meets the performance criteria of the alternative test procedure would also meet the performance criteria specified in subsection (c)(1)(A).
- (2) Any producer, importer, or distributor may apply to the executive officer for certification of a gasoline formulation in accordance with this subsection (c). The application shall be in writing and shall include, at a minimum, the following:
- (A) The name and chemical composition of the additive or additives in the gasoline formulation, except that if the chemical composition is not known to either the applicant or to the manufacturer of the additive (if other than the applicant), the applicant may provide a full disclosure of the chemical process of manufacture of the additive in lieu of its chemical composition.
- (B) The minimum concentration of each additive in the gasoline formulation in terms of gallons of additive per thousand gallons of gasoline.
- (C) The results of tests conducted on the gasoline formulation pursuant to the test procedures set forth in subsection (c)(1), all data generated by the tests, the identity of the entity which conducted each test, and a description of the quality assurance and quality control procedures used during the testing.
- (D) Data demonstrating that the fuel used for certification testing ("certification test fuel") is representative of the gasoline formulation for which certification is requested. Properties of the certification test fuel must be at least 80 percent of the maximum properties of the gasoline formulation to be certified for the following: aromatic hydrocarbon content, olefin content, sulfur content, and oxygen content. The T90 distillation temperature of the certification test fuel cannot be less than 40 °F below the gasoline formulation for which certification is requested All other certification test fuel properties must be representative of typical commercial gasoline.
- (E) Data demonstrating thathow the certification test fuel will beas produced from including a list of blend stocks, such as reformate, oxygenates, cracked stocks, alkylate, isomerate, straight run stocks and any other blend stocks, along with the percentage of the total which each blend stock comprises. Data may also be requested which demonstrates that the certification test fuel blend stocks are representative of typical California refinery blend stocks used for the production of California gasoline.

- (F) The theoretical mechanism of action (if known) of the additive in meeting any of the performance criteria set forth in subsection (c)(1)(A).
- (G) Copies of all material pertaining to the additive or additives in the gasoline formulation, submitted by the applicant to the U.S. Environmental Protection Agency pursuant to 40 CFR sections 79.6, 79.10 and 79.11. If the applicant has submitted no such material, copies of all material pertaining to the additive or additives in the gasoline formulation, submitted by the additive manufacturer to the U.S. Environmental Protection Agency pursuant to 40 CFR sections 79.6, 79.20 and 79.21.
- (H) A test method reasonably adequate for determining the presence and concentration of each additive in the gasoline, including test method reproducibility. The test method may involve identification of the presence of a surrogate marker substance if the applicant demonstrates that such test method will adequately demonstrate the presence and concentration of the additive.
- (3) Within 30 days of receipt of an application, the executive officer shall advise the applicant in writing either that it is complete or that specified additional information is required to make it complete. Within 30 days of submittal of additional information, the executive officer shall advise the applicant in writing either that the application is complete, or that specified additional information or testing is still required before it can be deemed complete.
- (4) If the executive officer finds that an application meets the requirements of this section and determines that the applicant has satisfactorily made the demonstrations identified in subsection (c)(1), then he or she shall issue an Executive Order certifying the gasoline fuel formulation. The executive officer shall act on a complete application within 30 days after the application is deemed complete.
- (5) If the executive officer determines that the gasoline sold by a producer, importer or distributor contains the minimum concentration of additives identified in an applicable certification, but substantially fails to meet the performance criteria set forth in subsection (c)(1), the executive officer shall revoke or modify the prior certification as is necessary to assure that gasoline sold by the producer, importer or distributor meets the performance criteria set forth in subsection (c)(1). The executive officer shall not revoke or modify a prior certification order without first affording the applicant for the certification an opportunity for a hearing in accordance with title 17, California Code of Regulations, part III, chapter 1, subchapter 1, article 4 (commencing with section 60040). If the executive officer determines that a producer, importer or distributor would be unable to comply with this regulation as a direct result of a certification revocation or modification pursuant to this subsection, the executive officer may delay the effective date of such revocation or modification for such period of time as is necessary to permit the person to come into compliance in the exercise of all reasonable diligence.
 - (d) Recordkeeping.
- (1) Each producer, importer, and distributor who has been issued a certification pursuant to subsection (c) must maintain records identifying each facility at which he or she adds an additive to California gasoline in order to comply with subsection (a)(1). For each such facility, the producer, importer or distributor must compile records showing on a monthly basis for each grade of gasoline:
- [i] the volume of California gasoline supplied from the facility by the producer, importer or distributor,
- [ii] the volume of California gasoline to which the producer, importer or distributor added the additive to comply with subsection (a)(1), and

- [iii] the name and volume of each additive (or additive package) added to the California gasoline fuel. Records covering a month must be compiled no later than 30 days after the end of the month, and must be retained for at least two years after the end of the month.
- (2) Any person required by subsection (d)(1) to compile and retain records must provide to the executive officer any such records within 20 days of a written request received from the executive officer or her/her designee before expiration of the period during which the records are required to be retained. Whenever such a person fails to provide records regarding a volume of California gasoline in accordance with this subsection (d)(2), the volume of California gasoline will be presumed to have been sold by the person in violation of subsection (a)(1).

Note: Authority cited: Sections 39600, 39601, 43013, 43018, and 43101 of the Health and Safety Code, and *Western Oil and Gas Ass'n.* v. *Orange County Air Pollution Control District*, 14 Cal.3d 411, 121 Cal.Rptr. 249 (1975). Reference: Sections 39000, 39001, 39002, 39003, 39500, 39515, 39516, 41511, 43000, 43016, 43018, and 43101, Health and Safety Code, and *Western Oil and Gas Ass'n.* v. *Orange County Air Pollution Control District*, 14 Cal.3d 411, 121 Cal.Rptr. 249 (1975).